I Claim:

1. Smoke detection and monitoring arrangement for monitoring presence of smoke within one or more zones of a building structure, comprising:

one or more detection units each being positioned within a respective zone within the structure, each said detection unit including a duct, an intake grille for admitting air from the zone into said duct, an optical tamper detector positioned at said grille, a low-volume smoke detector positioned within said duct, and means inducing an air flow in through said intake grille into said duct;

a main control panel providing visible indication of smoke and of tampering in each said zone being monitored; and

means communicating between the tamper detector and the smoke detector of each said detection unit and said main control panel.

2. Smoke detection and monitoring arrangement according to Claim 1 wherein said means for inducing an air flow includes a length of duct work adapted connect said duct with an exhaust vent.

3. Smoke detection and monitoring arrangement according to Claim 1 wherein said means for inducing an air flow includes a fan positioned within said duct.

4. Smoke detection and monitoring arrangement to Claim 1 wherein said one or more detection units includes an air flow detector within said duct, and said means for communicating includes means for signalling to said control panel when airflow is present.

5. Smoke detection and monitoring arrangement according to Claim 4 wherein said air

flow detector includes a vane positioned across the axis of air flow in the duct.

6. Smoke detection and monitoring arrangement according to Claim 1 wherein said main control panel includes a lockable enclosure having a locking front cover, and indicator lamps indicating for each zone, respectively, smoke detection and tamper indication.

7. Smoke detection and monitoring arrangement according to Claim 6 wherein said main control panel further includes an audible alarm sounder situated within said lockable enclosure.

8. Smoke detection and monitoring arrangement according to Claim 7, further including a reset button within said locking enclosure for permitting the sounder to be reset to OFF only by first unlocking the front panel.

9. Smoke detection and monitoring arrangement according to Claim 5 wherein said main control panel includes a service signalling means for indicating operative/inoperative status of the respective detection unit or units.

10. Smoke detection and monitoring arrangement according to Claim 9 wherein the service signalling means is responsive to status of the air flow detector.

11. Smoke detection and monitoring arrangement according to Claim 9 wherein the service signalling means is responsive to operability of the smoke detector of the respective detection unit.

12. Smoke detection and monitoring arrangement according to Claim 1 wherein said

intake grille is adapted to be mounted in a standard 2-foot by 2-foot aperture of a dropped ceiling.

13. Smoke detection and monitoring arrangement according to Claim 1 wherein said optical tamper detector situated at a center of said grille.

14. Smoke detection and monitoring arrangement according to Claim 1 wherein said optical tamper detector includes a photo presence switch.